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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/698,713	10/31/2003	Yih-Jen Dennis Chen	K35A1314	1559

35219 7590 06/28/2006

WESTERN DIGITAL TECHNOLOGIES, INC.
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EXAMINER

DAVIS, DAVID DONALD

ART UNIT PAPER NUMBER

2627

DATE MAILED: 06/28/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/698,713	Applicant(s) CHEN ET AL.	
	Examiner David D. Davis	Art Unit 2627	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 05 April 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 11-15 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 11-15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 11-15 are rejected under 35 U.S.C. 102(b) as being anticipated by Perry (US 4,851,943). As per claim 11, Perry shows in figure 1 a head stack assembly (HSA) 25 for use in a disk drive 10 including a disk 1. Figure 3 shows a merge tool is used to merge the HSA 25 with the disk 1 during manufacturing of the disk 1 drive 10. As shown in figures 1 and 3, the HSA 25 includes the following:

- (a) at least one actuator arm 26;
- (b) a suspension 22 connected to a distal end of the actuator arm 26;
- (c) a head 20 connected to a distal end of the suspension 22 with the suspension 22 for biasing the head 20 toward the disk 1; and
- (d) a multi-level shipping comb 100 attached to the actuator arm 26.

The multi-level shipping comb 100 includes at least one finger 120 & 125 for maintaining the suspension 22 in a near optimal vertical position. The finger 120 & 125 includes a first surface and a second surface with the second surface being raised relative to the first surface.

During shipping of the HSA 25, the first surface of the finger 120 & 125 contacts the suspension 22 to protect against overstressing the suspension 22. During manufacture of the disk drive 10, the shipping comb 100 is actuated so that the second surface contacts the suspension 22

Art Unit: 2627

thereby bending the suspension 22 in a vertical direction to facilitate the insertion of the merge tool.

As per claim 12, Perry shows in figure 4 the shipping comb 100 being actuated by rotating the shipping comb 100 so that the second surface contacts the suspension 22 thereby bending the suspension 22 in a vertical direction to facilitate the insertion of the merge tool. As per claim 4, Perry show in figure 4 the shipping comb 100 being actuated by rotating the shipping comb 100 in the first direction. As per claim 5, Perry shows in figure 4 the shipping comb 100 is actuated by rotating the shipping comb 100 in a second direction opposite a first direction. See column 6, lines 14-26 of Perry.

As per claim 13, Perry shows in figure 10, for example the following:

- (a) the second surface comprises a beveled surface with respect to the first surface; and
- (b) the suspension 22 slides over the beveled surface when the shipping comb 100 is actuated. As per claim 14, Perry discloses in column 6, lines 14-26 that after the merge tool is inserted, the shipping comb 100 is detached from the actuator arm 26 causing the suspension 22 to react vertically and engage the merge tool.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Art Unit: 2627

3. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

4. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Perry (US 4,851,943). Perry discloses the claimed invention. See description, supra. However, Perry is silent as to a coating on the finger to reduce friction.

Official notice is taken of the fact that coatings to reduce friction are notoriously old and well known in the art.

It would have been obvious to a person having ordinary skill in the art at the time the invention was made to provide the finger of Perry with a coating as taught in the art. The rationale is as follows: one of ordinary skill in the art at the time the invention was made would have been motivated to provide a coating (e.g. Teflon) on a finger, which is well within the purview of a skilled artisan and absent an unobvious result, so as to reduce friction.

Response to Arguments

5. Applicant's arguments filed April 5, 2006 have been fully considered but they are not persuasive. In the first full paragraph on page 10, applicant asserts the following:

Art Unit: 2627

In addition, the merge tool 100 disclosed by Perry cannot be considered a shipping comb because the merge tool 100 engages the HSA only during manufacturing of the disk drive, and not during shipping of the HSA as recited in claim 1. Applicant has not limited the term “shipping” to the extent suggested in the assertions found on page 10. As a result, the comb of Perry is not unlike the claimed “shipping comb” of the instant application. Assuming arguendo that the claim comb was limited to the extent suggested by applicant, it is inherent that the comb of Perry functions as a shipping comb in addition to a comb utilized during manufacture.

Conclusion

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

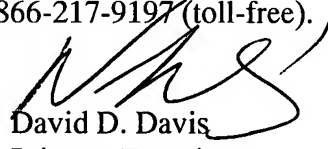
A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

Art Unit: 2627

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to David D. Davis whose telephone number is 571-272-7572. The examiner can normally be reached on Monday thru Friday between 7:30-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dwayne D. Bost can be reached on 571-272-7023. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



David D. Davis
Primary Examiner
Art Unit 2627

ddd